

**What Is Claimed Is:**

- 1        1. A direct backlight module comprising:
  - 2            a first plate;
  - 3            a second plate connected to the first plate forming a space between;
  - 4            a plurality of light sources disposed in the space; and
  - 5            a third plate with a plurality of openings disposed outside
  - 6            the space connected to the surface of the first plate.
- 1        2. The backlight module as claimed in claim 1, wherein  
2 the first plate comprises:
  - 3            a plurality of protrusions; and
  - 4            a plurality of recesses, wherein the plurality of
  - 5            protrusions and recesses are alternately
  - 6            arranged, and the plurality of light sources are
  - 7            disposed in the plurality of recesses.
- 1        3. The backlight module as claimed in claim 2, wherein  
2 the plurality of openings are disposed corresponding to the
- 3 plurality of protrusions and form a plurality of channels.
- 1        4. The backlight module as claimed in claim 3, wherein  
2 the third plate comprises a plurality of flexible portions
- 3 respectively connected to the sides of the channels.
- 1        5. The backlight module as claimed in claim 3, further  
2 comprising an enforced heat dissipation device.
- 1        6. The backlight module as claimed in claim 5, wherein  
2 the enforced heat dissipation device is a fan.

1           7. The backlight module as claimed in claim 2, wherein  
2       the height of each protrusion is lower than the center line of  
3       the light sources near the protrusion.

1           8. The backlight module as claimed in claim 2, wherein  
2       the cross-section of the plurality of protrusions and recesses  
3       is trapezoidal-shaped.

1           9. The backlight module as claimed in claim 2, wherein  
2       the cross-section of the plurality of protrusions and recesses  
3       is triangular-shaped.

1           10. The backlight module as claimed in claim 1, wherein  
2       the first plate is a reflector plate.

1           11. The backlight module as claimed in claim 1, wherein  
2       the second plate is a diffusion plate.

1           12. The backlight module as claimed in claim 1, wherein  
2       the third plate is a metal plate.

1           13. The backlight module as claimed in claim 1, wherein  
2       the plurality of light sources are lamps.

1           14. The backlight module as claimed in claim 1, further  
2       comprising:  
3           a first diffuser disposed on the second plate;  
4           a prism disposed on the first diffuser; and  
5           a second diffuser disposed on the prism.